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EXAMINER	
KLIMOWICZ, WILLIAM JOSEPH	

ART UNIT	PAPER NUMBER
2627	

MAIL DATE	DELIVERY MODE
05/15/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/527,851

Applicant(s)

ROSMALLEN, GERARD EDUARD

Examiner

William J. Klimowicz

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1 and 2 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1 and 2 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 16 March 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: ____.

DETAILED ACTION

Specification

Applicant should include Section Headings as articulated below:

- (I) Background of the Invention: See MPEP § 608.01(c). The specification should set forth the Background of the Invention in two parts:
 - (1) Field of the Invention: A statement of the field of art to which the invention pertains. This statement may include a paraphrasing of the applicable U.S. patent classification definitions of the subject matter of the claimed invention. This item may also be titled "Technical Field."
 - (2) Description of the Related Art including information disclosed under 37 CFR 1.97 and 37 CFR 1.98: A description of the related art known to the applicant and including, if applicable, references to specific related art and problems involved in the prior art which are solved by the applicant's invention. This item may also be titled "Background Art."
- (II) Brief Summary of the Invention: See MPEP § 608.01(d). A brief summary or general statement of the invention as set forth in 37 CFR 1.73. The summary is separate and distinct from the abstract and is directed toward the invention rather than the disclosure as a whole. The summary may point out the advantages of the invention or how it solves problems previously existent in the prior art (and preferably indicated in the Background of the Invention). In chemical cases it should point out in general terms the utility of the invention. If possible, the nature and gist of the invention or the inventive concept should be set forth. Objects of the invention should be treated briefly and only to the extent that they contribute to an understanding of the invention.
- (III) Brief Description of the Several Views of the Drawing(s): See MPEP § 608.01(f). A reference to and brief description of the drawing(s) as set forth in 37 CFR 1.74.
- (IV) Detailed Description of the Invention: See MPEP § 608.01(g). A description of the preferred embodiment(s) of the invention as required in 37 CFR 1.71. The description should be as short and specific as is necessary to describe the invention adequately and accurately. Where elements or groups of elements, compounds, and processes, which are conventional and generally widely known in the field of the invention described and their exact nature or type is not necessary for an understanding and use of the invention by a person skilled in the art, they should not be described in detail. However, where particularly complicated subject matter is involved or where the elements, compounds, or

processes may not be commonly or widely known in the field, the specification should refer to another patent or readily available publication which adequately describes the subject matter.

- (V) Claim or Claims: See 37 CFR 1.75 and MPEP § 608.01(m). The claim or claims must commence on separate sheet or electronic page (37 CFR 1.52(b)(3)). Where a claim sets forth a plurality of elements or steps, each element or step of the claim should be separated by a line indentation. There may be plural indentations to further segregate subcombinations or related steps. See 37 CFR 1.75 and MPEP § 608.01(i)-(p).
- (VI) Abstract of the Disclosure: See MPEP § 608.01(f). A brief narrative of the disclosure as a whole in a single paragraph of 150 words or less commencing on a separate sheet following the claims. In an international application which has entered the national stage (37 CFR 1.491(b)), the applicant need not submit an abstract commencing on a separate sheet if an abstract was published with the international application under PCT Article 21. The abstract that appears on the cover page of the pamphlet published by the International Bureau (IB) of the World Intellectual Property Organization (WIPO) is the abstract that will be used by the USPTO. See MPEP § 1893.03(e).

Specification

The spacing of the lines of the specification is such as to make reading difficult. New application papers with lines 1½ or double spaced on good quality paper are required.

Objection to Abstract

The abstract of the disclosure is objected to because its length exceeds 150 words. See MPEP 608.01(b), which cites 37 CFR 1.72 (b), and states:

A brief abstract of the technical disclosure in the specification must commence on a separate sheet, preferably following the claims, under the heading "Abstract " or "Abstract of the Disclosure." The ***abstract*** in an application filed under 35 U.S.C. 111 ***may not exceed 150 words in length***. The purpose of the abstract is to enable the United States Patent and Trademark Office and the public generally to determine quickly from a cursory inspection the nature and gist of the technical disclosure. The abstract will not be used for interpreting the scope of the claims.

Emphasis in bold italics added. Thus, the abstract must be amended so as to not exceed the 150 word limit. Correction is required.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Hanakawa et al. (JP 58-122630 A).

As per claim 1, Hanakawa et al. (JP 58-122630 A) discloses an optical disc apparatus (e.g., see FIGS. 3, 4) for recording and/or reproducing information on/from an information surface (e.g., the undersurface of disc (29)) of a rotatable optical disc (29), comprising: a supporting assembly (e.g., unshown chassis which supports spindle motor for disc and head block (20)); a motor (unshown spindle motor which spins disc (29) as known) for rotating the

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optical disc (29) about a spindle axis; optical means (including (21), (27), etc.) for scanning an information surface of said optical disc (29), comprising a focusing lens assembly (including (27) and its associated focusing coils) having a movable focusing lens (27) having a focusing axis (normal to disc surface) and a swing arm assembly (including 20) comprising a generally elongate swing arm structure (20) mounting said focusing lens assembly at a free end (e.g., the left end of (20) as seen in FIG. 3), the swing arm assembly being pivotally movable about a swing axis (about axis P as seen in FIG. 3) directed generally perpendicularly to the swing arm structure (20) and generally parallel to said spindle axis (i.e., the axis of spindle motor - at center of disc (29) as seen in FIG. 3), the swing arm assembly (including 20) comprising first pivoting means (see the P axis in FIG. 4, and corresponding up/down arrow at end of (20) in FIG. 4 - focus direction) for enabling focusing movements of said focusing lens assembly and second pivoting means (see the P axis in FIG. 3, and corresponding side-to-side arrows parallel to disc surface at end of (20) in FIG. 3 - tracking direction) for enabling pivotal scanning movements of the swing arm assembly (including (20)) and further comprising movable magnetic focusing means (coils 39, which when there is a current flowing, generate a magnetic field) provided near said free end (left end of (20) as seen in FIGS. 3, 4) of the swing arm assembly (including (20)) for driving said focusing lens (27) along said focusing axis (see up/down arrow in FIG. 4) to focus an optical beam (emanating from (21)) on the information surface (undersurface of disc (29)), and movable magnetic scanning means (coils 39, which when there is a current flowing, generate a magnetic field) for driving said swing arm assembly pivotally about said swing axis (P-axis as seen in FIG. 3) for scanning the information surface; stationary magnetic focusing means (including 31 - see also FIG. 5) associated with the supporting assembly (chassis of

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device upon which (31) is supported) for magnetically cooperating across an intermediate air gap (d) - see FIG. 5 - with said movable magnetic focusing means (coils 39, which when there is a current flowing, generate a magnetic field) provided near said free end (left end of (20) as seen in FIGS. 3, 4) for generating a magnetic force vector having a vector component parallel to said focusing axis (see double-arrow at end of (20) in FIG. 4) for driving the focusing lens assembly (including (27) and its associated focusing coil of coils (39)) along said focusing axis and stationary magnetic scanning means (31 - see also FIG. 5) associated with the supporting assembly (chassis of device upon which (31) is supported) associated with the supporting assembly (chassis) for magnetically cooperating across an intermediate air gap (d- FIG. 5) with said movable magnetic scanning means for generating a magnetic torque about said swing axis (P-axis as seen in FIG. 3) for driving the swing arm assembly (including (20)) about said swing axis (P-axis in FIG. 3 - see double arrow at left end of (20) in FIG. 3), wherein the swing arm structure (20) is rigid (in order to stiffly pivot about the pivot points P) from the free end up to at least adjacent the swing axis (P-axes) and the first pivoting means (see the P axis in FIG. 4, and corresponding up/down arrow at end of (20) in FIG. 4 - focus direction) are provided at or adjacent the second pivoting means (see the P axis in FIG. 3, and corresponding side-to-side arrows parallel to disc surface at end of (20) in FIG. 3 - tracking direction).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person

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having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hanakawa et al. (JP 58-122630 A) in view of Shimizu (JP 08-221912 A).

See the description of Hanakawa et al. (JP 58-122630 A), *supra*.

As per claim 2, Hanakawa et al. (JP 58-122630 A) remains silent to wherein the first pivoting means and/or second pivoting means comprise leaf spring means having a direction of high relative flexibility in the required pivoting direction only. Hanakawa et al. (JP 58-122630 A) in fact, appears to disclose convention roller bearing structure (e.g., element (30) as seen in FIG. 4).

Shimizu (JP 08-221912 A), however, discloses an analogous recording device wherein a transducer unit (14) is affixed at a free end of an arm structure in order to access information on an information disk at differing radial positions, via a swing axis (about pivot (5)).

Shimizu (JP 08-221912 A) readily recognizes that the roller bearing structure (used at (30) of Hanakawa et al. (JP 58-122630 A), is prone to deleterious friction due to a roller bearing structure (e.g., (30)), which could adversely affect transducer positioning.

Therefore, in order to obviate this problem, Shimizu (JP 08-221912 A) teaches using as a pivoting means, a leaf spring means (8) having a direction of high relative flexibility in the required pivoting direction only.

Given the express teachings and motivations, as espoused by Shimizu (JP 08-221912 A), it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the leaf spring means, as expressly suggested by Shimizu (JP 08-221912 A), in lieu of the roller bearing pivot structure of Hanakawa et al. (JP 58-122630 A).

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The rationale is as follows: one of ordinary skill in the art would have been motivated to provide the leaf spring means, as expressly suggested by Shimizu (JP 08-221912 A), in lieu of the roller bearing pivot structure of Hanakawa et al. (JP 58-122630 A) in order to “obtain an actuator for which a large range of head movement is adoptable and in which the influence of the friction of rolling bearings does not appear to a head positioning servo system.” See abstract of Shimizu (JP 08-221912 A).

Conclusion

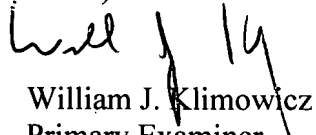
The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to William J. Klimowicz whose telephone number is (571) 272-7577. The examiner can normally be reached on Monday-Thursday (6:30AM-5:00PM).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hoa Thi Nguyen can be reached on (571) 272-7579. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.


William J. Klimowicz
Primary Examiner
Art Unit 2627

WJK